Some Thoughts on the Value Added from a New Round of Climate Change Damage Estimates

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Outline of Brief Remarks

- More complete paper available.
- *Section 1 – Issues with Coastal Storms.*
- Section 2 – Type 3 Error – Barking up the wrong tree means very little value added.
- Section 3 – There is an alternative – the Limiting Panel plus iteration – here is value added for an aggressive research agenda.
- Economic analyses of impacts help ID places where adaptation would be important; "laugh test context for the alternative.

Experiment Results - SCC

Case	Min	5th	Mean	95th	99th	Max	Mean of Lower 99%	Contribution of Top 1% to Mean
Default	-$4	$12	$106	$259	$1191	$12215	$85	20%

Symmetric default settings for the economic damage and sea level rise calibrations

Case	Min	5th	Mean	95th	99th	Max	Mean of Lower 99%	Contribution of Top 1% to Mean
Case A	-$1	$12	$106	$258	$1168	$10084	$85	20%

Ranges for the two economic damage parameters diminished by 50%

Case	Min	5th	Mean	95th	99th	Max	Mean of Lower 99%	Contribution of Top 1% to Mean
Case B	-$2	$10	$102	$248	$1108	$9131	$80	22%

Ranges preserved but distribution skewed with the mode 50% lower

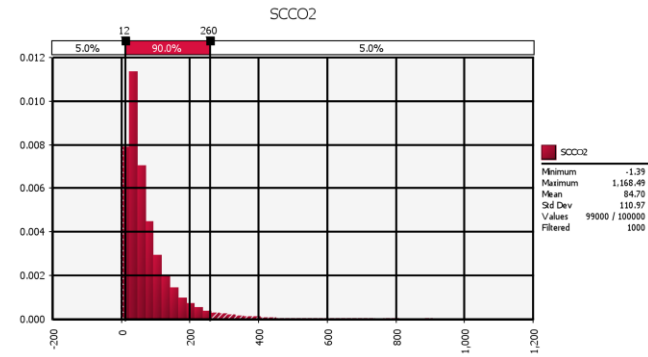| Case	Min	5th	Mean	95th	99th	Max	Mean of Lower 99%	Contribution of Top 1% to Mean
Case C	-$3	$13	$111	$272	$1218	$13166	$89	20%

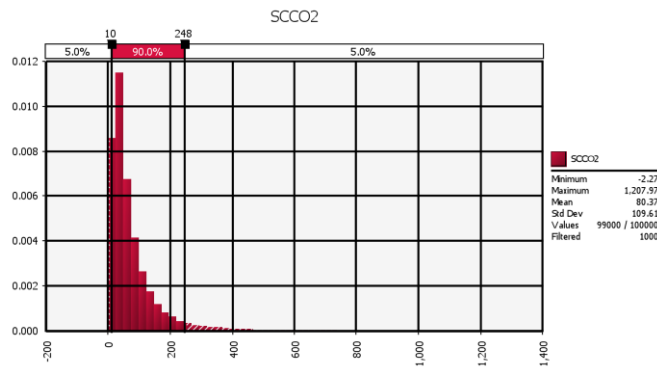*Ranges preserved but distributions skewed with the mode 50% higher*
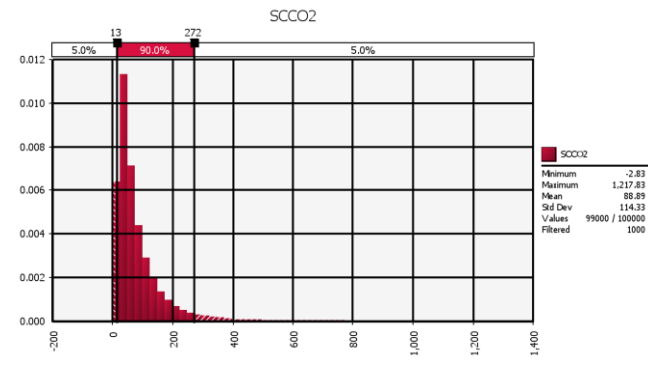
Experiment Results - SCC
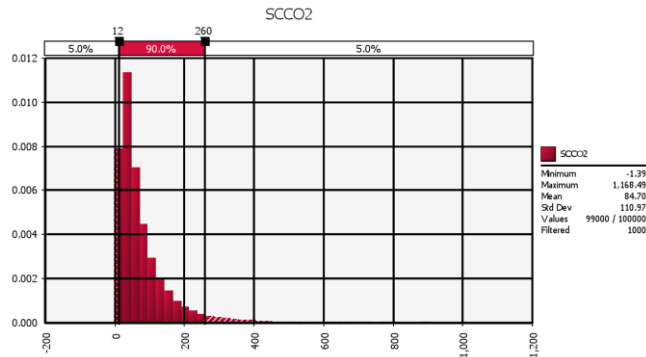
- Panel A – Default

Panel B – Reduced Range

- Panel C – Mode 50% Lower

Panel D – Mode 50% Higher

An Alternative Approach – A Different Tree for Barking with higher Value Added

- Use assessment of climate risk to determine long-term objective and medium-term carbon budget – *build the iterative process*

- Work within the process to determine US contribution to the budget

- *Compute scarcity rent trajectory for the budget (a la Hotelling) and then add details of economic growth, technological development, etc... build the iterative process.*

- Use the results to price carbon for non-climate policy needs

- Use IAM results to (1) check the "laugh test", (2) design cost-minimizing approaches (including net economic damage) and (3) highlight areas where adaptation in economic sectors will be most productive.